

Abstract

AGGREGATION DEVICES PROCESSING KEEP-ALIVE MESSAGES OF POINT-TO-POINT SESSIONS

Several keep-alive messages of point to point (PPP) sessions received from a remote

5 system are aggregated into a single packet in an aggregation device (e.g., network access
server). The aggregated packet is sent to a peer aggregation device (e.g., home gateway) at
the other end of the PPP session. The peer aggregation device may send the status of the
sessions in a single packet. As a result, the data traffic on a communication backbone due
to keep-alive status checks may be reduced. Without waiting for the peer aggregation device
10 to provide the status information, a proxy reply may be generated from the aggregation
device.